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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/613,943	07/07/2003	Alfred R. Globus		6749

43399 7590 06/01/2006

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EXAMINER

PAK, JOHN D

ART UNIT PAPER NUMBER

1616

DATE MAILED: 06/01/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	10/613,943	GLOBUS, ALFRED R.	
	<b>Examiner</b>	<b>Art Unit</b>	
	JOHN PAK	1616	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 09 March 2006.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 2-9 and 12-15 is/are pending in the application.
- 4a) Of the above claim(s) 12-14 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 2-9 and 12-15 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)             | 4) <input type="checkbox"/> Interview Summary (PTO-413)                     |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)    | Paper No(s)/Mail Date. _____  |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date _____   | 6) <input type="checkbox"/> Other: _____                                    |

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This Office action is in response to applicant's amendments and remarks filed on 3/9/2006.

Claims 2-9 and 12-15 are pending in this application. Claims 12-14 are withdrawn from further consideration as being directed to non-elected subject matter. Claims 2-9 and 15 will presently be examined.

The following is a quotation of the second paragraph of 35 U.S.C. 112:

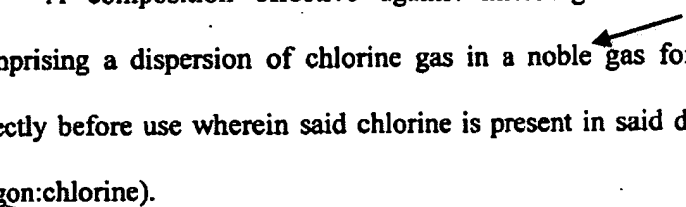
The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 2-9 and 15 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

(1) Independent claim 15 is confusing. First, see below.

**Claim 15 (new)**

A composition effective against microorganism and other pest organisms comprising a dispersion of chlorine gas in a noble gas formed by mixing the gases directly before use wherein said chlorine is present in said dispersion in a ratio of 20:1 (argon:chlorine).



The composition apparently comprises chlorine gas in a noble gas but the ratio is given in terms of argon. It is unclear whether the noble gas should be changed to argon or

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the argon should be changed to noble gas. Claim 2 makes it even more confusing and claim 8 appears to be duplicative.

Second, the ratio is not specified as to type. Is the ratio by moles, volume, parts, partial pressure, etc.? The type of ratio would materially affect the claimed composition.

(2) The percentage in claim 9 should be specified. Is it percent based on partial pressure, moles, volume, etc.?

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 2-8 and 15 are rejected under 35 U.S.C. 102(b) as being anticipated by Meyer (US 4,427,185).

Meyer explicitly discloses an "argon-chlorine gas mixture in the ratio of about 95% to 5% (column 4, lines 43-44).

Upon further review, it has been determined that Meyer still anticipates the amended claims. It is recognized that the amended claims recite a ratio of 20:1 (argon:chlorine). Meyer discloses "about 95% to 5%" (emphasis added) argon to chlorine. The term "about" is the critical term here. Said term includes a small range with the given value. It certainly includes 95.24% argon, which is less than 0.3% from

the given 95%. The 95.24% argon would require 4.76% chlorine to make 100%, which as a ratio of 20:1 argon to chlorine gas. The ratio feature is thereby met by Meyer's explicit disclosure.

Additionally, the feature, "formed by mixing the gases directly before use" does not distinguish over Meyer's gas mixture because such product by process step does not actually change the composition per se.

Further, as stated before in the previous Office action in discussion Meyer's disclosure, the fact that the same exact gas mixture is disclosed by Meyer means that said mixture would necessarily have possessed the same properties as applicant's gas mixture. MPEP 2112, 2112.01. The claims are thereby anticipated.

Claims 2-8 and 15 are rejected under 35 U.S.C. 102(b) as being anticipated by Gordon et al. (US 4,046,823)

Gordon et al. explicitly disclose a gas mixture that contains chlorine, argon and ethane. Chlorine to ethane molar range includes 1:1 (claim 5). Argon to ethane molar range includes 20:1 (claim 2). The gas components are mixed together directly before use (claim 1).

Chlorine and argon are explicitly disclosed in a mixture. Since the same chlorine and argon are present, the same activity would necessarily be present. The claims are thereby anticipated.

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Applicant is advised that the present claims have been examined on the merits vis-a-vis prior art to the extent that claim 15 appears to require argon, albeit confusingly. Prior art issues that *may* be relevant to other non-argon noble gases are therefore not addressed here. If applicant amends claim 15 to clearly read on all noble gases, applicant is advised herein that a new ground of rejection in response to such an amendment can be made final because applicant's amendment would have necessitated such an amendment. At this time, it is unclear whether applicant will amend claim 15 to limit it to argon or broaden it to noble gases.

Any inquiry concerning this communication or earlier communications from the Examiner should be directed to JOHN PAK whose telephone number is **(571)272-0620**. The Examiner can normally be reached on Monday to Friday from 8 AM to 4:30 PM.


If attempts to reach the Examiner by telephone are unsuccessful, the Examiner's SPE, Johann Richter, can be reached on **(571)272-0646**.

The fax phone number for the organization where this application or proceeding is assigned is **(571)273-8300**.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (571)272-1600.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
JOHN PAK  
PRIMARY EXAMINER  
GROUP 1600